



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------|-------------|----------------------|---------------------|------------------|
| 10/649,482 | 08/27/2003 | Katsutoshi Shibayama | 8180/8176 | 5850 |

7590 10/08/2004

Kenneth L. Mitchell
(Woodling, Krost and Rust)
9213 Chillicothe Road
Kirtland, OH 44094

EXAMINER

SHARMA, RASHMI K

| ART UNIT | PAPER NUMBER |
|----------|--------------|
|----------|--------------|

3651

DATE MAILED: 10/08/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/649,482

Applicant(s)

KATSUTOSHI SHIBAYMA

Examiner

Rashmi K. Sharma

Art Unit

3651

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 14 July 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-3 is/are pending in the application.
- 4a) Of the above claim(s) 3 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1 and 2 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Election/Restrictions

Applicant's election without traverse of claims 1 and 2 in the reply filed on 7/14/2004 is acknowledged.

Priority

Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 1 and 2 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The term "a flat surface including a tangential line" recited in claim 1 line 7 appears to be unclear as to exactly which hinge the flat surface belongs to. Further clarification is required.

The term "an angle of inclination" in claim 1 line 7 is a relative term which renders the claim indefinite. The term "angle of inclination" is not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one

of ordinary skill in the art would not be reasonably apprised of the scope of the invention. Further clarification is required as to which hinge the Applicant is referring to.

Claim 1 line 9 recites "as it goes from the central axis" renders the claim indefinite. It is unclear as to exactly what structure the term "it" is referring to in the claim language. Further clarification is required.

Claim 1 recites the limitation "said top plate pin-connected" in line 3. There is insufficient antecedent basis for this limitation in the claim. Correction or further clarification is required.

Claim 2 recited "edges" in line 2. It appears as though "edges" has already been introduced in the language in claim 1 line 5, it is unclear if these are the same edges or not. Further clarification is required.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1 and 2 are rejected under 35 U.S.C. 102(b) as being anticipated by Shibayama et al. (U.S. Patent number 6,189,686).

Shibayama et al. discloses a conveyor chain (60) having a plurality of links (20) arranged in rows, each of said links (20) including a top plate (10) having a flat top surface (13) and a hinge portion (see figure 5) provided on said top plate pin-connected

(30) to front hinge portions (see figure 5) of a link (20) positioned on the front side and to a rear hinge portions (see figure 5) positioned on the rear side, edges (see figure 3, area above reference numeral 11 or figure 5 reference numeral 14) adjacent to links (20) positioned on the front and rear sides in said top plate (10) and said hinge portion each consisting of a curved surface (see figure 2, element to the left of reference numeral 11) characterized in that an angle of inclination formed by a flat surface (area around 14 in figure 5) including a tangential line with respect to said edge and said top surface (13) of said top plate (10) is formed to be smaller as it goes from the central axis of said link (20) in its arrangement direction toward a link side surface (see figure 5). Shibayama et al. also discloses a conveyor chain, characterized in that said top plate (10) includes dummy front hinges (14, 15) on both sides of said link portion (20), edges adjacent to a link (20) positioned on the front side in said front dummy hinges (14, 15) are each formed in a curved surface and that an angle of inclination formed by a flat surface including a tangential line with respect to the curved surface and said top surface (13) of said top plate (10) is formed to be smaller as it goes from the central axis of said link in its arrangement direction toward a link side surface.

Conclusion


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Rashmi K. Sharma whose telephone number is 703-306-5952. The examiner can normally be reached on Monday-Thursday.

Art Unit: 3651

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Eileen Lillis can be reached on 703-308-3248. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

rks



EILEEN D. LILLIS
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 3600